1    Claim 1.    A method for implementing a segmentation addressing

2    operation comprising the steps of:

3    providing a first logical address and a segment,

4    deriving a linear address from the logical address and the segment in a

5    first discrete sub-step in which the properties of a logical address are

6    checked to determine whether those properties are consistent with the

7    criteria for addressing the segment, and

8    performing a base add operation to determine the linear address in a

9    second discrete sub-step.

1    Claim 2.    A method for implementing a segmentation operation

2    comprising the steps of:

3    providing a first segment selector for deriving a linear address of a

4    segment descriptor in a first descriptor table,

5    providing a second segment selector for deriving a linear address of a

6    segment descriptor in a second descriptor table,

7    attempting an access of the first descriptor table to derive a segment

8    descriptor,

9    attempting an access of the second descriptor table to derive a segment

10   descriptor if the access of the first descriptor table fails, and

11   storing a derived segment descriptor from a successful attempted access

12   in a descriptor register.

1    Claim 3.    A method as claimed in Claim 2 in which any attempt to

2    access is divided into discrete sub-steps comprising:

3    checking properties of a logical address to determine whether those

4    properties are consistent with the criteria for addressing a first descriptor

5    table in a first discrete sub-step of deriving a linear address, and

6    performing a base add operation to determine the linear address as a

7    second discrete sub-step of deriving a linear address.